

Abstract

Purple tea in Kenya, TRFK 306, has received great attention due to its perceived health benefits though how it should be optimally manufactured has not been researched on exhaustively. The current study investigated on the two possible methods of manufacture – Cut Tear and Curl (CTC) and orthodox manufacture - with varying withering time of 0, 5, 10, 15 and 20 hours. Catechins, gallic acid, caffeine, total polyphenols and antioxidant activity were assayed as quality indicators. If gallic acid and caffeine are the main chemicals targeted, then orthodox type with longer withering, 15 – 20 hours, is usually recommended. When targeting catechins especially epigallocatechin gallate and high total polyphenols, orthodox type of manufacture whichever the withering time is proposed. CTC with withering hours of 15-20 produces teas with high antioxidant activity. It was concluded that TRFK 306 is best processed by orthodox or CTC but with longer withering time.